## ABSTRACT OF THE DISCLOSURE

In a device for cooling an electrical component and to the production method thereof, the inventive device includes a metallic radiator-forming member which is thermally connected to a metallic mass of the component that forms a heat-dissipating mass. The radiator is thermally connected to the dissipating mass by at least one heat sink which is formed by an autogenous weld between one face of the dissipating mass, known as the dissipating face, and one face of the radiator, which are facing one another. The invention can be used to cool electronic components, for example, in power electronic modules.